

NEW SPECIES OF AUSTRALIAN FISHES.

By J. DOUGLAS OGILBY.

HARENGULA STEREOLEPIS, sp.nov.

Spratelloides delicatulus (not Bennett), Alleyne & Macleay, Proc. Linn. Soc. N.S. Wales, i. 1877, p. 350.

D. 15-17. A. 16. Sc. 45/12.

Dorsal and ventral profiles about equally convex. Depth of body $3\frac{1}{3}$ to $3\frac{3}{5}$, length of head $3\frac{3}{4}$ to 4 in the total length; width of body $2\frac{1}{4}$ to $2\frac{1}{3}$ in its depth; depth of head $1\frac{1}{5}$ to $1\frac{3}{10}$, width of head $2\frac{1}{9}$ to $2\frac{1}{4}$, of interorbital region 4 to $4\frac{1}{4}$, diameter of eye $2\frac{4}{5}$ to 3 in the length of the head; snout $\frac{1}{5}$ to $\frac{1}{4}$ of a diameter shorter than the eye. Maxillary extending to the vertical from the anterior border of the pupil, its length $2\frac{1}{10}$ to $2\frac{1}{4}$ in that of the head, its width $2\frac{1}{4}$ to $2\frac{2}{5}$ in its length. 32 or 33 gill-rakers on the lower branch of the anterior arch, the longest $1\frac{9}{10}$ to 2 in the diameter of the eye ($5\frac{1}{3}$ to 6 in the head). Dorsal fin originating $\frac{1}{5}$ to $\frac{3}{10}$ nearer to the extremity of the snout than to the base of the caudal fin, its height $\frac{1}{10}$ to $\frac{1}{5}$ more than its length, and $1\frac{2}{5}$ to $1\frac{1}{2}$ in the head: length of anal slightly less than that of dorsal; ventral inserted below or a little in advance of the middle of the dorsal, and midway between the tip of the mandible and the base of the caudal or a little nearer to the latter, its length 2 to $2\frac{1}{5}$ in the head: pectoral with 15 or 16 rays, originating below the angle of the subopercle, $1\frac{1}{3}$ to $1\frac{1}{2}$ in the head: lower caudal lobe a little the longer, $3\frac{3}{4}$ to 4 in the total length. Scales firmly adherent, each with four or five vertical striæ and indistinctly pectinated margin; accessory scale of ventral lanceolate, $2\frac{7}{8}$ to $3\frac{1}{5}$ in the length of the head; abdominal scutes strong, 19 + 13. Upper surface of head rugose; parietal and postfrontal regions striated; opercle smooth. Vertebrae 45.

Back blue, sides golden, the colours passing gradually into one another; upper surface of head gray, the dorsal profile of the snout and the extremity of the jaws reddish-brown: dorsal and caudal with some dark dots: iris golden.

E t y m o l o g y:—*στερεός*, firm or adherent: *λεπίς*, scale: so named in allusion to the adherence of the scales which can only be removed with the exercise of considerable force.

D i s t r i b u t i o n:—Torres Straits; Darnley Island; ?South-eastern New Guinea.

T y p e:—In the Macleay Museum, Sydney University.

This pretty little herring appears to be common in Torres Straits, whence numerous specimens now in the University Museum came; others are in the collection of the Australian Museum, but I cannot find any record of them. My largest example is 108 millimeters in length.

Alleyne and Macleay write of them thus:—"This fish was seen in enormous shoals at Darnley Island during the fortnight which the Chevert lay there. At that time—the early part of August—the whole northern shore of the island was literally black with them, and there would have been no difficulty, with proper appliances, in preserving hundreds of tons of these finest of all sardines."

DECAPTERUS LEPTOSOMUS, sp.nov.

D. viii, i 33-36 i. A ii, i 25-28 i. L. l 115-117.

Body moderately compressed, its width $1\frac{1}{5}$ to $1\frac{2}{5}$ in its depth; depth of body $5\frac{1}{3}$ to 6, length of head $3\frac{2}{3}$ to 4 in the total length; depth of head $1\frac{2}{3}$ to $1\frac{4}{5}$, width of interorbital region 4 to $4\frac{1}{5}$, diameter of eye $3\frac{1}{3}$ to $3\frac{1}{2}$ in the length of the head; snout narrow and compressed, a little longer than the diameter of the eye; interorbital region flat; a feeble occipital keel. Maxillary extending to or not quite to the anterior border of the eye, its length from the tip of the snout $2\frac{2}{3}$ to $2\frac{4}{5}$, that of the mandible $2\frac{1}{4}$ to $2\frac{1}{2}$ in the head; width of maxillary $2\frac{3}{4}$ to 3 in its length. Upper jaw toothless, lower with a single series of small teeth; vomer

with two patches of teeth anteriorly and a long narrow band on the shaft; bands of teeth on the palatines, pterygoids, and tongue. 31 to 33 gill-rakers on the lower branch of the anterior arch, the longest 2 to $2\frac{1}{3}$ in the diameter of the eye. Origin of the first dorsal a little in advance of the middle of the pectoral, the third or fourth ray the longest, $1\frac{4}{5}$ to 2 in the head, the two last almost concealed in the dorsal groove; second dorsal originating a little nearer to the base of the caudal than to the extremity of the snout, the anterior rays the longest, not so long as those of the first dorsal: free anal spines moderately strong: ventral not reaching midway to the vent, the second ray the longest, $2\frac{1}{10}$ to $2\frac{1}{5}$ in the head: pectoral with 23 to 25 rays, extending to or a little beyond the vertical from the sixth dorsal spine, its length $1\frac{2}{5}$ to $1\frac{1}{2}$ in the head: caudal small, $5\frac{3}{4}$ to $6\frac{1}{5}$ in the total length. Cheeks, occiput, and breast scaly; two series of scales extending forward along the middle of the interorbital region; preorbital and preopercle with radiating muciferous canals. Lateral line gently curved to below the twelfth dorsal ray, the straight part shorter than the curved, with 25 to 28 spinose plates.

Blue above, silvery below the lateral line; a small black opercular spot: dorsal, caudal, and pectoral fins dotted with black.

E t y m o l o g y:—*λεπτός*, slender; *σῶμα*, body.

D i s t r i b u t i o n:—Port Jackson.

Our Mackerel-Scad is known to the fishermen as a "small kind of Cowanyung," which is not so far astray, the true "Cowanyung" being, as far as can be conjectured from the description given to me, the adult Yellowtail (*Trachurus declivis*) or some closely allied species. It is said to visit the coast every spring, and enters the harbours in company with the half-grown Yellowtails, but not nearly in the same numbers, only a few Cowanyung—restricting that name to the *Decapterus*—being found in a school of Yellowtail. My largest example measures 170 millimeters, and I am told that it rarely exceeds this length.

This species differs greatly from *Decapterus kohern*, Hector, and *D. eclipsifer*, DeVis.